

United States Patent and Trademark Office





UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

APPLICATION NO.	FILING DATE	' FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.	
10/036,871	11/29/2001	William Duda		5568	
7590 06/07/2004			EXAMINER		
William Duda			DINH, DUC Q		
43 Wood Ave. Brick town, NJ	08724		ART UNIT	PAPER NUMBER	
 ,			. 2674	10	
			DATE MAILED: 06/07/2004		

Please find below and/or attached an Office communication concerning this application or proceeding.

	Appl	ication No.	Applicant(s)					
	10/0	36,871	DUDA, WILLIAM					
Office Action Summary		niner	Art Unit					
		Q DINH	2674					
- The MAILING DATE of this con	5							
Period for Reply			•					
A SHORTENED STATUTORY PERIOD THE MAILING DATE OF THIS COMI - Extensions of time may be available under the proafter SIX (6) MONTHS from the mailing date of thi - If the period for reply specified above is less than - If NO period for reply is specified above, the maxi - Failure to reply within the set or extended period for Any reply received by the Office later than three meanned patent term adjustment. See 37 CFR 1.70	MUNICATION. visions of 37 CFR 1.136(a). In s communication. thirty (30) days, a reply within th num statutory period will apply a or reply will, by statute, cause th onths after the mailing date of t	no event, however, may ne statutory minimum of and will expire SIX (6) M ne application to become	a reply be timely filed hirty (30) days will be considered timely. ONTHS from the mailing date of this commu ABANDONED (35 U.S.C. § 133).	inication.				
Status								
1) Responsive to communication(s) filed on 29 Novemb	er 2001.	•					
2a)☐ This action is FINAL.	2b)⊠ This action							
3) Since this application is in cond	lition for allowance ex	cept for formal m	atters, prosecution as to the me	erits is				
• —	closed in accordance with the practice under <i>Ex parte Quayle</i> , 1935 C.D. 11, 453 O.G. 213.							
Disposition of Claims								
4)⊠ Claim(s) <u>1-31</u> is/are pending in	the application							
4a) Of the above claim(s)		n consideration						
5) Claim(s) is/are allowed.	_ 10/0/0	., 55115145141511.						
6)⊠ Claim(s) <u>1-31</u> is/are rejected.								
7) Claim(s) is/are objected	to.							
8) Claim(s) are subject to r		on requirement.						
Application Papers								
	by the Evaminer							
.— .	9) The specification is objected to by the Examiner.							
	0) The drawing(s) filed on is/are: a) accepted or b) objected to by the Examiner.							
	Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).							
	Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d). The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.							
•	to by the Examino			02 .				
Priority under 35 U.S.C. § 119								
12) Acknowledgment is made of a capital and all bold Some * cold None 1. Certified copies of the price of the price of the certified copies of the ce	of: ority documents have ority documents have pies of the priority doc national Bureau (PCT	been received. been received in cuments have been Rule 17.2(a)).	Application No en received in this National Stag	је				
* See the attached detailed Office	action for a list of the (certified copies n	ot received.					
Attachment(s)								
1) Notice of References Cited (PTO-892)			v Summary (PTO-413)					
 Notice of Draftsperson's Patent Drawing Rev Information Disclosure Statement(s) (PTO-14 Paper No(s)/Mail Date 			o(s)/Mail Date f Informal Patent Application (PTO-152)				

Application/Control Number: 10/036,871

Art Unit: 2674

DETAILED ACTION

The following guidelines illustrate the preferred layout for the specification of a utility application. These guidelines are suggested for the applicant's use.

Arrangement of the Specification

As provided in 37 CFR 1.77(b), the specification of a utility application should include the following sections in order. Each of the lettered items should appear in upper case, without underlining or bold type, as a section heading. If no text follows the section heading, the phrase "Not Applicable" should follow the section heading:

- (a) TITLE OF THE INVENTION.
- (b) CROSS-REFERENCE TO RELATED APPLICATIONS.
- (c) STATEMENT REGARDING FEDERALLY SPONSORED RESEARCH OR DEVELOPMENT.
- (d) INCORPORATION-BY-REFERENCE OF MATERIAL SUBMITTED ON A COMPACT DISC (See 37 CFR 1.52(e)(5) and MPEP 608.05. Computer program listings (37 CFR 1.96(c)), "Sequence Listings" (37 CFR 1.821(c)), and tables having more than 50 pages of text are permitted to be submitted on compact discs.) or

REFERENCE TO A "MICROFICHE APPENDIX" (See MPEP § 608.05(a). "Microfiche Appendices" were accepted by the Office until March 1, 2001.)

- (e) BACKGROUND OF THE INVENTION.
 - (1) Field of the Invention.
 - (2) Description of Related Art including information disclosed under 37 CFR 1.97 and 1.98.
- (f) BRIEF SUMMARY OF THE INVENTION.
- (g) BRIEF DESCRIPTION OF THE SEVERAL VIEWS OF THE DRAWING(S).
- (h) DETAILED DESCRIPTION OF THE INVENTION.
- (i) CLAIM OR CLAIMS (commencing on a separate sheet).
- (j) ABSTRACT OF THE DISCLOSURE (commencing on a separate sheet).
- (k) SEQUENCE LISTING (See MPEP § 2424 and 37 CFR 1.821-1.825. A "Sequence Listing" is required on paper if the application discloses a nucleotide or amino acid sequence as defined in 37 CFR 1.821(a) and if the required "Sequence Listing" is not submitted as an electronic document on compact disc).

Content of Specification

(a) <u>Title of the Invention</u>: See 37 CFR 1.72(a) and MPEP § 606. The title of the invention should be placed at the top of the first page of the specification unless the title is provided in an application data shet. The title of the invention should be brief but technically accurate and descriptive, preferably from two to seven words may not contain more than 500 characters.

Application/Control Number: 10/036,871

Art Unit: 2674

- (b) Cross-References to Related Applications: See 37 CFR 1.78 and MPEP § 201.11.
- (c) <u>Statement Regarding Federally Sponsored Research and Development</u>: See MPEP § 310.
- (d) Incorporation-By-Reference Of Material Submitted On a Compact Disc: The specification is required to include an incorporation-by-reference of electronic documents that are to become part of the permanent United States Patent and Trademark Office records in the file of a patent application. See 37 CFR 1.52(e) and MPEP § 608.05. Computer program listings (37 CFR 1.96(c)), "Sequence Listings" (37 CFR 1.821(c)), and tables having more than 50 pages of text were permitted as electronic documents on compact discs beginning on September 8, 2000.

Or alternatively, <u>Reference to a "Microfiche Appendix"</u>: See MPEP § 608.05(a). "Microfiche Appendices" were accepted by the Office until March 1, 2001.

- (e) <u>Background of the Invention</u>: See MPEP § 608.01(c). The specification should set forth the Background of the Invention in two parts:
 - (1) <u>Field of the Invention</u>: A statement of the field of art to which the invention pertains. This statement may include a paraphrasing of the applicable U.S. patent classification definitions of the subject matter of the claimed invention. This item may also be titled "Technical Field."
 - (2) <u>Description of the Related Art including information disclosed under 37 CFR 1.97 and 37 CFR 1.98</u>: A description of the related art known to the applicant and including, if applicable, references to specific related art and problems involved in the prior art which are solved by the applicant's invention. This item may also be titled "Background Art."
- (f) Brief Summary of the Invention: See MPEP § 608.01(d). A brief summary or general statement of the invention as set forth in 37 CFR 1.73. The summary is separate and distinct from the abstract and is directed toward the invention rather than the disclosure as a whole. The summary may point out the advantages of the invention or how it solves problems previously existent in the prior art (and preferably indicated in the Background of the Invention). In chemical cases it should point out in general terms the utility of the invention. If possible, the nature and gist of the invention or the inventive concept should be set forth. Objects of the invention should be treated briefly and only to the extent that they contribute to an understanding of the invention.
- (g) <u>Brief Description of the Several Views of the Drawing(s)</u>: See MPEP § 608.01(f). A reference to and brief description of the drawing(s) as set forth in 37 CFR 1.74.

Application/Control Number: 10/036,871

Art Unit: 2674

- (h) Detailed Description of the Invention: See MPEP § 608.01(g). A description of the preferred embodiment(s) of the invention as required in 37 CFR 1.71. The description should be as short and specific as is necessary to describe the invention adequately and accurately. Where elements or groups of elements, compounds, and processes, which are conventional and generally widely known in the field of the invention described and their exact nature or type is not necessary for an understanding and use of the invention by a person skilled in the art, they should not be described in detail. However, where particularly complicated subject matter is involved or where the elements, compounds, or processes may not be commonly or widely known in the field, the specification should refer to another patent or readily available publication which adequately describes the subject matter.
- (i) Claim or Claims: See 37 CFR 1.75 and MPEP § 608.01(m). The claim or claims must commence on separate sheet or electronic page (37 CFR 1.52(b)(3)). Where a claim sets forth a plurality of elements or steps, each element or step of the claim should be separated by a line indentation. There may be plural indentations to further segregate subcombinations or related steps. See 37 CFR 1.75 and MPEP § 608.01(i)-(p).
- (j) Abstract of the Disclosure: See MPEP § 608.01(f). A brief narrative of the disclosure as a whole in a single paragraph of 150 words or less commencing on a separate sheet following the claims. In an international application which has entered the national stage (37 CFR 1.491(b)), the applicant need not submit an abstract commencing on a separate sheet if an abstract was published with the international application under PCT Article 21. The abstract that appears on the cover page of the pamphlet published by the International Bureau (IB) of the World Intellectual Property Organization (WIPO) is the abstract that will be used by the USPTO. See MPEP § 1893.03(e).
- (k) <u>Sequence Listing.</u> See 37 CFR 1.821-1.825 and MPEP §§ 2421-2431. The requirement for a sequence listing applies to all sequences disclosed in a given application, whether the sequences are claimed or not. See MPEP § 2421.02.
- 1. The application submitted on 11/29/2001 should have been submitted as a separate paper as required by 37 CFR 1.4(c). The paper has been entered. However, all future correspondence must comply with 37 CFR 1.4.
- 2. A series of singular dependent claims is permissible in which a dependent claim refers to a preceding claim which, in turn, refers to another preceding claim.

Application/Control Number: 10/036,871

Art Unit: 2674

A claim which depends from a dependent claim should not be separated by any claim which does not also depend from said dependent claim. It should be kept in mind that a dependent claim may refer to any preceding independent claim. In general, applicant's sequence will not be changed. See MPEP § 608.01(n).

- 3. The amendment to the claims filed on July 10th, 2002 and March 31, 2004 do not comply with the requirements of 37 CFR 1.121(c) because of the Reason as stated in the Notice of Non-Compliant Amendment (37CRF 1.121) mailed on March 03, 2004 and May 19, 2004.

 Amendments to the claims filed on or after July 30, 2003 must comply with 37 CFR 1.121(c) which states:
- (c) Claims. Amendments to a claim must be made by rewriting the entire claim with all changes (e.g., additions and deletions) as indicated in this subsection, except when the claim is being canceled. Each amendment document that includes a change to an existing claim, cancellation of an existing claim or addition of a new claim, must include a complete listing of all claims ever presented, including the text of all pending and withdrawn claims, in the application. The claim listing, including the text of the claims, in the amendment document will serve to replace all prior versions of the claims, in the application. In the claim listing, the status of every claim must be indicated after its claim number by using one of the following identifiers in a parenthetical expression: (Original), (Currently amended), (Canceled), (Withdrawn), (Previously presented), (New), and (Not entered).
- (1) Claim listing. All of the claims presented in a claim listing shall be presented in ascending numerical order. Consecutive claims having the same status of "canceled" or "not entered" may be aggregated into one statement (e.g., Claims 1–5 (canceled)). The claim listing shall commence on a separate sheet of the amendment document and the sheet(s) that contain the text of any part of the claims shall not contain any other part of the amendment.
- (2) When claim text with markings is required. All claims being currently amended in an amendment paper shall be presented in the claim listing, indicate a status of "currently amended," and be submitted with markings to indicate the changes that have been made relative to the immediate prior version of the claims. The text of any added subject matter must be shown by underlining the added text. The text of any deleted matter must be shown by strike-through except that double brackets placed before and after the deleted characters may be used to show deletion of five or fewer consecutive characters. The text of any deleted subject matter must be shown by being placed within double brackets if strike-through cannot be easily perceived. Only claims having the status of "currently amended," or "withdrawn" if also being

Application/Control Number: 10/036,871

Art Unit: 2674

amended, shall include markings. If a withdrawn claim is currently amended, its status in the claim listing may be identified as "withdrawn—currently amended."

- (3) When claim text in clean version is required. The text of all pending claims not being currently amended shall be presented in the claim listing in clean version, i.e., without any markings in the presentation of text. The presentation of a clean version of any claim having the status of "original," "withdrawn" or "previously presented" will constitute an assertion that it has not been changed relative to the immediate prior version, except to omit markings that may have been present in the immediate prior version of the claims of the status of "withdrawn" or "previously presented." Any claim added by amendment must be indicated with the status of "new" and presented in clean version, i.e., without any underlining.
 - (4) When claim text shall not be presented; canceling a claim.
- (i) No claim text shall be presented for any claim in the claim listing with the status of "canceled" or "not entered."
- (ii) Cancellation of a claim shall be effected by an instruction to cancel a particular claim number. Identifying the status of a claim in the claim listing as "canceled" will constitute an instruction to cancel the claim.
- (5) Reinstatement of previously canceled claim. A claim which was previously canceled may be reinstated only by adding the claim as a "new" claim with a new claim number.

Specification

4. The spacing of the lines of the specification is such as to make reading and entry of amendments difficult. New application papers with lines double spaced on good quality paper are required.

Claim Objections

- 5. Claim 28 objected to because of the following informalities: line 5, "vice" should read "voice" Appropriate correction is required.
- 6. The numbering of claims is not in accordance with 37 CFR 1.126 which requires the original numbering of the claims to be preserved throughout the prosecution. When claims are canceled, the remaining claims must not be renumbered. When new claims are presented, they

Application/Control Number: 10/036,871 Page 7

Art Unit: 2674

must be numbered consecutively beginning with the number next following the highest numbered claims previously presented (whether entered or not). In the instant case, there are two claims numbered as claim 12. Therefore, the second occurrence of claim 12 is considered as misnumbered claim 12 and misnumbered claims 12-30 have been renumbered as 13-31. *Claim*

Rejections - 35 USC § 112

- 7. The term "should have" in renumbered claim 18 is a relative term which renders the claim indefinite. The term "should have" is not defined by the claim, the specification does not provide a standard for ascertaining the requisite degree, and one of ordinary skill in the art would not be reasonably apprised of the scope of the invention. It is not clear that the antenna "should have" or "should not have" the telescoping capability as the recited limitation.
- 8. Renumbered claim 21 recites the limitation "the switch" in line 1. There is insufficient antecedent basis for this limitation in the claim.

Claim Rejections - 35 USC § 103

- 9. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
 - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

Application/Control Number: 10/036,871

Art Unit: 2674

10. Claims 1-12 and renumbered claims 13-31 are rejected under 35 U.S.C. 103(a) as being unpatentable over Daley, III (U. S. Patent No. 6,167,413), hereinafter Daley in view of Hori et al. (U. S. Patent No. 5,072,209), hereinafter Hori.

In reference to claim 1, Daley discloses a wearable computer comprising a cap portion and a visor projecting from the cap that inherently having a first and second stiffness, the visor including an upwardly facing surface and a downwardly facing surface (col. 5, lines 30-45). As shown in Fig. 1 a computer 24 is provided for the system with a wireless link 98 and 198 and a rechargeable battery. Daley does not disclose a solar cell and antenna for the system. Hori discloses a display system for vehicles using solar cell for recharge the rechargeable battery and antenna for transmitting and receiving data for the system.

It would have been obvious for one of ordinary skill in the art at the time of the invention was made to provide the antenna for transmitting data between module of the system and solar cell for the rechargeable battery so that a lot of time and labor to charge the battery separately may be saved (col. 2, lines 40-45).

In reference to claim 2, Daley discloses the electronic module is located in the visor in Fig. 5.

In reference to claim 3, FIG. 2 of Daley provides a detailed functional block diagram of an embodiment of the wearable computer system, designated 20a, which is consistent with FIG.

1. As shown, the computing unit 24 includes a computing module 26. The computing module 26 includes a CPU kernel comprising a CPU 26a, a memory subsystem 26b (RAM, ROM, etc.), a storage sub-system 26c (fixed storage and or removable storage), and other known and possibly required items. Importantly, a communication module 30 may be included to provide

Application/Control Number: 10/036,871

Art Unit: 2674

required communication functions. For example, if the wearable computer system 20a is to be operated 'off-line', the communication module 30 may simply provide a serial channel to download and upload data. Alternately, if the application requires frequent or constant connectivity, the communication module 30 may include components to support a wireless (online) link to another system. As such, a wireless link may be provided as a line-of-sight Infrared (IR) link, a cell-type communication link, or a suitable satellite link, again as required. Further, the capabilities of the computing module 30 may vary significantly with the application requirements. The same can be said for the audio module 32. The capabilities of the audio module 32 may range from simple tone generation for annunciation to voice synthesis/generation, as required by specific applications. An astute reader, and certainly those skilled in the art, may note that a 'user interface' often includes items such as displays, audio components, annunciators, etc. Although this is generally true, the user interface 28 of the present embodiment may be assumed to represent a sub-set of I/O devices available to the wearer/user: essentially a plurality of input devices. For example, as illustrated the user interface 30 of FIG. 2 may preferably include (at minimum) a pointing device and switch means. Briefly, these devices are provided to enable the wearer to input commands, responses, and data, to the computing module 26, as required. However, other components and devices may be included with, or simply grouped with, the user interface 28, as needed to support a specific application. Therefore, it must be understood that the architecture of the embodiment of the computing unit 24 (and the computing module 26), represents one of many possible architectures (col. 6, lines 13-54).

Application/Control Number: 10/036,871

Art Unit: 2674

In reference to claims 4-5, Daley discloses the system may be configured to include devices including a microphone, a camera, a global satellite positioning (GPS) module, a high capacity read/write drive, a modem, and or an Ethernet interface (col. 4, lines 1-5).

In reference to claim 6, refer to the rejection as applied to claim 3. Furthermore, see column 8, lines 10-27 of Daley.

In reference to claims 7 and 11, Daley discloses everything except the shape and size of the electronic/solar cell, absent a showing of critically and/or unexpected result, it would been obvious to one of ordinary skill in the art to reshape the electronic device of Daley as desired as was judicially recognized with IN RE DAILLEY, 149USPQ 47 (CCPA 1976), which recognizes that change in FORM or SHAPE of well known element is normally not desired toward patentable subject matter.

In reference to claims 8, 10-12, Daley disclose the support structure for the display in Figs. 5-9. It would have been obvious for one of ordinary skill in the art at the time of the invention was made to provide appropriate pins and/or receptacles for supporting and securing the display to the visor.

In reference to claim 9, refer to the rejection applied to claim 3.

In reference to renumbered claims 13-15, refer to the rejection as applied to claims 8, 1012.

In reference to renumbered claim 16, refer to the rejection as applied to claim 1. In addition, absent a showing of critically and/or unexpected result, it would been obvious to one of ordinary skill in the art to integrate the antenna to the computer device of Daley as desired as was judicially recognized with IN RE LARISON, 144 USPQ 144(CCPA 1976), which recognizes

Art Unit: 2674

that making integral of well known element is normally not desired toward patentable subject matter.

In reference to renumbered claims 17-19, refer to the rejection as applied to claim 1. In addition, absent a showing of critically and/or unexpected result, it would been obvious to one of ordinary skill in the art to relocate the antenna as desired as was judicially recognized with IN RE JAPIKEE USPQ 70 (CCPA 1950), which recognizes that the relocation of well known element is normally not desired toward patentable subject matter.

In reference to renumbered claims 20-23, Hori discloses the system in Fig. 6 satisfying the claim limitation.

In reference to renumbered claim 24, see Fig 5 of Daley.

In reference to renumbered claim 25, refer to the case law rejection as applied to claims 17-19.

In reference to renumbered claims 26-28, Daley discloses the system in Fig. 2 including audio module and communication module for up/downloading data, storage 26a, 26b, and removable storage 204, audio module 32 and Daley discloses the system may be configured to include devices including a microphone, a camera, a global satellite positioning (GPS) module, a high capacity read/write drive, a modem, and or an Ethernet interface (col. 4, lines 1-5).

In reference to renumbered claims 29 and 31, refer to the rejection as applied to claim 16.

In reference to renumbered claim 30, refer to the rejection as applied to claim 3.

11.

Art Unit: 2674

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to **DUC Q DINH** whose telephone number is (703) 306-5412 The examiner can normally be reached on Mon-Fri from 8:00.AM-4:00.PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, RICHARD A HJERPE can be reached on (703) 305-4709.

Any response to this action should be mailed to:

Commissioner of Patents and Trademarks

Washington, D.C. 20231

Or faxed to:

(703) 872-9314 (for Technology Center 2600 only)

Hand-delivery response should be brought to: Crystal Park II, 2121 Crystal Drive, Arlington, Va Sixth Floor (Receptionist)

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the Technology Center 2600 Customer Service Office whose telephone number is (703) 306-0377.

DUC Q DINH Examiner Art Unit 2674

DQD May 28, 2004

REGINA LIANG PRIMARY EXAMINER